Regulatory Analysis

Of

Proposed Wastewater Fees

Notice of Intended Action
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I. Background

The Department of Natural Resources (DNR) has proposed the adoption of wastewater fees. The proposed rules were approved by the Environmental Protection Commission at its October 17, 2005 meeting, and they were included in a Notice of Intended Action published on November 9, 2005 in the *Iowa Administrative Bulletin* as **ARC 4652B**. Several terms used in the description of the proposed fees are specific to wastewater permitting, and these terms are defined at the end of this document.

The purpose of the proposed rules is to supplement the existing wastewater funding sources to improve the wastewater program and to achieve goals for program improvement. There are several goals for the improvement of the program, listed below:

- Over 90% of non-stormwater NPDES permits renewed before expiration by December 2008
- All NPDES permit justifications are based on sound science and are legally defensible
- Increase assistance to applicants for completing non-stormwater NPDES permit applications
- Decrease backlog of wasteload allocations
- Decrease turnaround time for wasteload allocations
- Increase assistance to consultants requesting wasteload allocations
- Decrease backlog of construction projects not funded by the State Revolving Fund
- Decrease turnaround time for construction projects not funded by the State Revolving Fund
- Increased frequency of informal visits by field staff—especially at smaller facilities

The Notice of Intended Action proposes the following changes:

- remove the annual fee option of \$300 for storm water discharge associated with industrial activity and storm water discharges from municipal separate storm sewer systems
- remove the fees for participants in an approved group application where EPA has issued a model general permit and no industry–specific general permit is available or being developed
- add the following fees for General Permit #5 (Discharge form Mining and Processing Facilities), due at time of application for coverage under the general permit

Annual option	\$125
3 year coverage	\$300
4 year coverage	\$400
5 year coverage	\$500

Add the following fees for non-stormwater NPDES permits

Application fee	
Submitted at the time of application	\$85
Annual fees	
Municipal Major	\$1,500
Municipal Minor	\$250
Industrial Major	\$4,000
Industrial Minor	\$350
Semi-public	\$400
Operation permit	\$200
Open feedlot	\$400
Confinement AFO	\$250

The DNR intended to include tiered construction permit fees, similar to the tiered fees for non-stormwater NPDES permits, in the Notice of Intended action, but the Notice was published incorrectly. The informational item that was discussed at the September 19, 2005 Environmental Protection Commission Meeting contained the correct fees for construction permits. It is the intent of the DNR to change the final rule to include the tiered construction permit fees. The proposed construction permit fees, to be included in the final rule, are as follows:

Sewer extensions (new or replacement)	\$50
Trunk/Interceptor/Pump Stations	\$100
Domestic wastewater treatment system	\$100
upgrades - no change in process type	
Domestic wastewater systems upgrades -	\$250
change in process type	
New domestic facilities	\$500
Industrial upgrades - no change in process type	\$300
Industrial upgrades - change in process type	\$500
New Industrial Facility	\$750

The Administrative Rules Review Committee reviewed the proposed rules (without the tiered construction permit fees) during its meeting on December 13, 2005. At that time, the committee voted to direct the Department of Natural Resources (DNR) to complete a regulatory analysis of the proposed rules, in compliance with Iowa Code section 17A.4A, subsection 2, paragraph "a." The elements to be included in the regulatory analysis are specifically identified as follows:

- (1) A description of the classes of persons who probably will be affected by the proposed rule, including classes that will bear the costs of the proposed rule and classes that will benefit from the proposed rule.
- (2) A description of the probable quantitative and qualitative impact of the proposed rule, economic or otherwise, upon affected classes of persons,

including a description of the nature and amount of all of the different kinds of costs that would be incurred in complying with the proposed rule.

- (3) The probable costs to the agency and to any other agency of the implementation and enforcement of the proposed rule and any anticipated effect on state revenues.
- (4) A comparison of the probable costs and benefits of the proposed rule to the probable costs and benefits of inaction.
- (5) A determination of whether less costly methods or less intrusive methods exist for achieving the purpose of the proposed rule.
- (6) A description of any alternative methods for achieving the purpose of the proposed rule that were seriously considered by the agency and the reasons why they were rejected in favor of the proposed rule.

Each of these elements will be addressed in turn, under the assumption that the proposed wastewater fees will be redirected to the DNR by the state legislature during the current (spring 2006) session. If the rule becomes effective and the proposed fees remain directed to the general fund, and no money from these fees is redirected to DNR, none of the benefits listed below will be applicable and the regulated community (referred to as entities below) will retain all of the costs. The DNR will propose a bill this session to divert the funds from the wastewater fees back to the DNR.

If the proposed fees are redirected from the general fund to the DNR, the fees will be used to add three NPDES permit writers, one construction permit engineer, one wasteload allocation engineer, and six field office staff. The additional staff will allow the wastewater program to meet the goals stated above.

II. Elements of the Analysis

A. Description of the classes of persons who probably will be affected by the proposed rule, including classes that will bear the costs of the proposed rule and classes that will benefit from the proposed rule.

All entities that must apply for or hold a wastewater construction permit, NPDES General Permit #5, or individual non-stormwater NPDES permit will be affected by and bear the cost of these rules. Fees are proposed to be added for all of these permit types. Entities that must apply for a wastewater construction permit include municipalities and industries, as construction permits are required for the construction of any municipal and industrial treatment or collection facilities that discharge treated wastewater to a river or stream. Entities that must apply for NPDES General Permit #5 (Discharge form Mining and Processing Facilities) are facilities primarily engaged in mining or quarrying of dimension stone, crushed and broken limestone, and construction sand and gravel.

Entities that must apply for or hold an individual non-stormwater NPDES wastewater permit include all industries, municipalities, and semi-publics that operate facilities that discharge wastewater directly to surface waters of lowa, and certain animal feeding operations (AFOs). Municipal entities include cities, towns, and any other public body created under state law. Semi-publics include mobile home parks, trailer courts, campgrounds, restaurants, gas stations, and other small businesses that operate wastewater treatment systems that discharge to water of the state. The holders of operation permits are considered semi-publics, but operation permits are for land application of wastewater, rather than discharge of wastewater to a waterbody. Thus, the persons who will be affected by and bear the cost of these rules include industries, municipalities, mining and quarrying operations, and semi-public businesses and facilities.

Animal feeding operations (AFO) required to have individual non-stormwater NPDES permits include open feedlots with 1000 or more animal units, open feedlots with a stream passing through the feedlot or other direct manure discharge with 300 or more animal units, and open feedlots or confinement operations that are required to obtain a permit as a result of DNR evaluation. Currently, the DNR has issued approximately 65 non-stormwater NPDES permits to AFOs. Only those AFOs that are required to have a non-stormwater NPDES permit will be affected by and bear the cost of this proposed rule

Entities that must apply for individual stormwater permits will also be affected by this proposed rule. Entities that must apply for individual stormwater permits include city storm sewer systems in larger communities or those near larger communities (this currently includes only 45 permittees). The option to pay an annual fee for individual stormwater permits is proposed to be removed, in order to shorten processing time for these permits and to prevent five-year permits from expiring after one year due to non-payment of the annual fee. The fees for individual stormwater permits will not increase, as the five-year permit fee will remain the same. Entities that must apply for individual stormwater permits will not bear the cost of this rule, as their permit fees are not increasing. These entities will also not benefit from the proposed rule, as no new stormwater program staff will be added with revenues for the proposed fees.

Entities that hold NPDES General Permits #1 (Stormwater Discharges Associated with Industrial Activity), #2 (Stormwater Discharges Associated with Industrial Activity for Construction Activities), #3 (Stormwater Discharges Associated with Industrial Activity from Asphalt Plants, Concrete Batch Plants, and Rock Crushing Plants), and #4 (Discharge form On-site Wastewater Treatment and Disposal Systems), will not be affected by this proposed rule.

B. A description of the probable quantitative and qualitative impact of the proposed rule, economic or otherwise, upon affected classes of persons, including a description of the nature and amount of all of the different kinds of costs that would be incurred in complying with the proposed rule.

Each different type of entity required to have a wastewater construction permit, NPDES General Permit #5, or individual non-stormwater NPDES wastewater permit will incur a different cost. Industries will need to add the additional fees into their operating budget, drawing from their profits or increasing the cost of their services to consumers. The cost for the fees will be passed on to the consumers of the industrial products.

Municipalities will likely need to increase their sewer rates to cover the additional fees for construction permits and non-stormwater NPDES permits. The following table illustrates the projected rise in sewer fees on an annual basis for several different municipalities, if the money for the annual non-stormwater NPDES permit fee is derived solely from city sewer bills.

Table 1. Projected Annual Increase in Sewer Rates for Selected Municipalities

City	Population	Projected increase in sewer rates (per capita)	
Major Cities			
Ames	50,731	3¢	
Cedar Rapids	120,758	2¢	
Chariton	4,573	33¢	
Des Moines	198,682	Less than 1¢	
Eldora	3,035	50¢	
Fairfeild	9,602	16¢	
Tama	2,731	55¢	
Minor Cities			
Arispe	89	\$2.80	
Exline	191	\$1.31	
Manchester	5,257	5¢	
Jefferson	4,626	6¢	
Slater	1,306	19¢	
Stratford	746	34¢	
West Union	2,549	10¢	

The above table does not include the cost of applying for a construction permit. Most municipalities require few, if any, construction permits each year, as sewer collection systems and wastewater treatment facilities are not upgraded every year. Cities that are undergoing expansion and large cities performing continuing maintenance will require more construction permits annually. If a municipality requires construction permits for the upgrade of their collection system or

wastewater facility, sewer rates will have to be raised by a corresponding amount to compensate for the construction permit application fee.

Semi-public facilities and businesses will need to raise the costs of their services or take money from their profits. For example, mobile home parks and trailer courts will need to increase their sewer rates, campgrounds will likely need to raise their camping rates, and restaurants and gas stations will either derive the money from their parent corporation, raise product prices, or use profit money to pay the fee, decreasing their profit margin.

AFOs that are required to have NPDES permits will experience an increase in operating costs, as they lack a customer base to which they could pass the fees. This will decrease the profits for those AFOs.

C. The probable costs to the agency and to any other agency of the implementation and enforcement of the proposed rule and any anticipated effect on state revenues.

The DNR would incur costs processing fees and requesting fee payment, in the form of staff time, letters (mailing costs) and phone calls (telephone costs). DNR staff, both in the central office and in the field offices, would spend time drafting letters and contacting entities by phone that is not spent now.

State revenues will increase by the total amount of the proposed fees, estimated to be \$877,200 annually. The proposed rule currently directs these fees to the State General Fund, but the DNR is proposing legislation to redirect these fees to DNR (see discussion under "Background" above).

D. A comparison of the probable costs and benefits of the proposed rule to the probable costs and benefits of inaction.

Costs of the Proposed rule

- increased financial burden on entities required to have or apply for a wastewater construction permit, NPDES General Permit #5, or individual non-stormwater NPDES permit
- higher sewer rates for communities and some semi-publics (MHP)
- higher costs to consumers of services and products from entities required to have or apply for a wastewater construction permit, NPDES General Permit #5, or individual non-stormwater NPDES permit
- higher costs for AFOs required to have a non-stormwater NPDES permit

Benefits of the Proposed Rule to Permittees

- faster processing of permit applications (both construction and NPDES),
- faster issuance of non-stormwater NPDES permits
- faster issuance of wastewater construction permits
- quicker response to general permit questions

- quicker response to amendment requests
- quicker response to wasteload allocation requests from consulting engineers designing wastewater treatment improvements
- more compliance and operational assistance in the field

Benefits of inaction on the proposed rule

 no increased financial burden on any of the entities covered by or required to obtain construction permits, General Permit #5, or NPDES permits

Costs of inaction on the proposed rule to the entities regulated by permits

- continued delays in processing of their construction and operating permit applications
- continued delays in processing of any permit amendment requests
- continued delays in receipt of final construction and NPDES permits
- continued delays in response to requests for compliance assistance
- continued delays in response to wasteload allocation requests
- regulated entities would continue to wait to have their questions addressed by the DNR

Costs of inaction on the proposed rule to the DNR

- continued lack of staff resources to meet all of the needs of the permittees
- current backlog of NPDES permits, wasteload allocations, and construction projects (not funded by the State Revolving Loan Fund) would increase
- Field staff would be unable to perform more inspections and compliance checks
- Field staff would be unable to offer compliance and operational assistance to all that request it
- NPDES program would not meet its goals
- **E.** A determination of whether less costly methods or less intrusive methods exist for achieving the purpose of the proposed rule.

One less costly method to supplement existing funding sources for the NPDES and AFO Programs would be lower the proposed amount of the fees. Lowering the proposed fee amounts would result in fewer staff, decreasing the benefits of the proposed rule. As proposed, the fees are already lower that those in the surrounding states. For example, under the proposed rules, a minor municipal facility would pay \$250 per year in lowa, and \$3,000 per year in Missouri. A major municipal facility would pay \$1,500 per year in lowa and \$31,000 per year in Minnesota. A major Industrial facility would pay \$4,000 per year in lowa, and \$6,500 per year in Minnesota.

Another method of collecting fees that would be less costly to many of the smaller regulated entities would be to base the wastewater fees for the non-stormwater NPDES permits on the design flow of the regulated facility, rather that

on the type of facility. As proposed, the fees are based on the type of facility (minor, major, semi-public, open or confinement AFO), on the amount of time it takes to review and process the applications, and on how much time it takes to regulate and inspect the facilities. More time is required to review applications and draft permits for major facilities and industrial facilities vs. minor and municipal facilities, and semi-public facilities take more oversight from field staff than minor municipal facilities.

Rather than having a flat fee for each type of facility, the fees could be based on the design of the facility. The DNR has the design information for all facilities, and this information is already used in the permits as a basis for monitoring requirements. Under this option, small facilities would pay less than large facilities, instead of all facilities of one type paying the same amount. Under the proposed fee structure, all facilities of one type would be charged the same amount.

The option to charge fees based on the design of the facility was presented at a stakeholder meeting in early 2005, before the fee rules were developed. Attendees at the stakeholder meeting included representatives from wastewater and municipal organizations and wastewater operators. The stakeholders were concerned about a fee structure based on design flows. They were of the opinion that this type of fee structure would be too confusing. Fees based on facility design could not be looked up in the rules or on the internet, rather, each entity would be required to contact a permit writer to determine the appropriate fee for their facility. Also, facilities considering an upgrade would be required to consider higher fees when redesigning the facility. The stakeholders preferred the flat fee based on facility type, as this would be easier for entities to understand, and would be easier for the DNR to administer. They also preferred to base the fees on the relative level of effort required to issue permits and regulate each facility. Thus, for simplicity and at the recommendation of the stakeholders, the proposed rules fees were based on facility type, rather than on facility design.

F. A description of any alternative methods for achieving the purpose of the proposed rule that were seriously considered by the agency and the reasons why they were rejected in favor of the proposed rule.

The DNR, in its effort to achieve the goals listed in "Background" above, utilized two alternative methods. First, a Kaizen Continuous Permitting Process Improvement event was conducted for the NPDES section during the week of September 27, 2004. A Kaizen event is an action-oriented five-day event in which an empowered team takes immediate action to improve a specific process. The team, consisting of DNR employees and outside stakeholders, analyzed the process used to write NPDES permits with the goal of increasing the speed, quality, and quantity of NPDES permits by developing a standardized permit process.

The Kaizen event resulted in an improved permitting process that includes more stakeholder involvement. Customer (permittee) service was improved, and more permit application forms are completed now than before the Kaizen event. The benefits to the permittees from the Kaizen event include application forms that are pre-filled before they are sent to the permittees, and follow up calls from permit writers to offer them assistance completing the forms or interpreting the instructions.

The average number of permits drafted each month increased slightly after the Kaizen event, from 12 permits per month to 13.8 permits per month on average. However, this slight increase was not enough to meet the workload demand. There are five hundred and sixty-two permits expiring in 2006, an average of 46 per month, vs. 14 permits drafted per month after the Kaizen event.

A Kaizen event was also held for the wastewater construction permit process March of 2004. This event outlined a process for reviewing construction permits that takes substantially less time than before. However, DNR does not have enough resources for wastewater construction projects not funded by the State Revolving Fund to keep up with the workload.

Second, the NPDES section conducted an internal process review, to further refine and clarify the permit-writing process. The goals of the internal process improvement were to issue permits faster and more accurately and to document the permitting process for consistency among permit writers and for training new staff. The internal process improvement was completed in October of 2005. It resulted in a permit writer's manual, where none had existed before. This manual was designed to assist in the training of new permit writers and to assure consistency between permit writers.

The two permitting process improvement events conducted by the NPDES section did result in a better, more refined, and well-documented permitting process. However, the events did not decrease the permit workload. Currently, there are approximately 1500 individual non-stormwater NPDES permits, each of which expires every 5 years. In 2005, 172 permits were issued (these numbers do not include AFOs). The current permit backlog (permits that have expired and have not been renewed) is approximately 300 permits, or 20% of the total. In order to achieve program goals and to properly address all of the applications for construction permits, non-stormwater NPDES permits, and General Permit #5, the DNR needs to hire additional staff. The proposed fees (if redirected from the general fund to the DNR) will fund the necessary additional staff positions and allow the wastewater program to meet its goals.

Definitions

<u>Construction Permit</u> – written approval of the director to construct a wastewater disposal system or part thereof in accordance with the plans and specifications approved by the DNR. Construction, installation or modification of any wastewater disposal system including sanitary sewer extensions requires a construction permit issued by the DNR.

<u>General Permit</u> – an NPDES permit issued to a class of facilities which could be conditioned and described by a single permit.

<u>Major</u> – for municipalities, it means a facility having a discharge flow or wet weather design flow of 1.0 million gallons per day (MGD) or greater. For industries, it means a facility which is designated by EPA as being a major industry based on the EPA point rating system which uses pounds of wastes discharged for each facility.

<u>Minor</u> – all remaining municipal and industrial facilities which have wastewater discharge flows which are not designated as major facilities (minor municipals have a discharge flow or wet weather design flow of less than 1.0 million gallons per day).

<u>Municipality</u> – city, town, borough, county, parish, district, association or other public body created by or under state law.

NPDES (National Pollutant Discharge Elimination System) - The NPDES program regulates the direct discharge of wastewater to surface waters. Under this program, industrial facilities and POTWs (publicly owned treatment works) must receive a NPDES permit before discharging wastewater directly to surface waters. This program was created by the Clean Water Act and the authority to issue NPDES permits has been delegated to lowa by the Environmental Protection Agency.

<u>NPDES Permit</u> – an operation permit that authorizes the discharge of any pollutant into a navigable water.

<u>Operation Permit</u> – a written permit authorizing the operation of a wastewater disposal system or part thereof or discharge source, and, if applicable, the discharge of wastes from said disposal system or part thereof or discharge source to waters of the state.

<u>Semi-public</u> (sewage disposal system) – a system for the treatment or disposal of domestic sewage which is not a private sewage disposal system and which is not owned by a city, sanitary sewer district, or a designated and approved management agency.

<u>State Revolving Fund</u> - The Clean Water State Revolving Fund (CWSRF) loan funds can be used by municipalities and sanitary districts to finance the design and construction of almost all publicly owned wastewater treatment and conveyance improvements. State Revolving Fund Loan Program offers communities and sanitary districts low interest loans for the construction of wastewater treatment and collection system improvements. This loan program is available for modifying or constructing publicly-owned wastewater projects only.

<u>Stormwater</u> – storm water runoff, snow melt runoff, and surface runoff and drainage.

<u>Wasteload Allocation (WLA)</u> – the calculation of water-quality based effluent limits for a specific discharge. A wasteload allocation consists of a document prepared by staff that includes background information on the stream flows, effluent flows, basis for calculations, and summary of calculations performed.

References

Iowa League of Cities. http://www.iowaleague.org/AboutCities/CitiesInIowa.aspx Iowa League of Cities Information Services Department, 2005.